

WHAT IS CLAIMED IS:

1 1. A communication entity for facilitating compressed
2 message communication, said communication entity comprising:
3 a context table containing context information
4 associated with at least one communication message;
5 a compressor, in communication with said context table,
6 said compressor using said context information to compress
7 at least one transmitted communication message; and
8 a decompressor, in communication with said context
9 table, said decompressor using said context information to
10 decompress at least one received communication message.

1 2. The communication entity of claim 1, wherein said
2 context information comprises at least a portion of at least
3 one information field of said at least one communication
4 message.

1 3. The communication entity of claim 2, wherein said
2 at least a portion of said at least one information field
3 comprises at least one header field.

1 4. The communication entity of claim 3, wherein said
2 at least one header field comprises at least one Internet
3 Protocol header field.

1 5. The communication entity of claim 1, wherein said
2 context information comprises a dictionary.

1 6. The communication entity of claim 1, wherein said
2 at least one transmitted communication message is transmitted
3 using a first communication channel and said at least one
4 received communication message is received over a second
5 communication channel, said first communication channel and
6 said second communication channel comprising a channel pair.

1 7. The communication entity of claim 1, wherein said
2 communication entity comprises a mobile terminal.

1 8. The communication entity of claim 1, wherein said
2 communication entity comprises a base station.

1 9. The communication entity of claim 1, wherein said
2 at least one transmitted communication message is compressed
3 using a first context, and said at least one received
4 communication message is decompressed using a second context.

1 10. The communication entity of claim 9, wherein said
2 first context is substantially the same as said second
3 context.

1 11. A method for facilitating compressed message
2 communication, said method comprising the steps of:

3 maintaining a context table containing context
4 information associated with at least one communication
5 message;

6 compressing at least one transmitted communication
7 message using said context information; and

8 decompressing at least one received communication
9 message using said context information.

1 12. The method of claim 11, wherein said context
2 information comprises at least one information field of said
3 at least one communication message.

1 13. The method of claim 12, wherein said at least one
2 information field comprises at least one header field.

1 14. The method of claim 13, wherein said at least one
2 header field comprises at least one Internet Protocol header
3 field.

1 15. The method of claim 11, wherein said context
2 information comprises a dictionary.

1 16. A method for facilitating compressed message
2 communication, said method comprising the steps of:
3 compressing a first communication message having first
4 context information to produce a first compressed message;
5 storing said first context information in a context
6 table;
7 transmitting said first compressed message over a first
8 communication channel;
9 receiving a second compressed message over a second
10 communication channel;
11 decompressing said second compressed message to produce
12 a second communication message having second context
13 information; and
14 storing said second context information in said context
15 table.

1 17. The method of claim 16, wherein said first
2 communication channel and said second communication channel
3 comprising a channel pair.

1 18. The method of claim 16, wherein at least one of
2 said first context information and said second context
3 information comprises at least one information field of an
4 Internet Protocol.

1 19. The method of claim 18, wherein said at least one
2 information field comprises at least one header field.

1 20. The method of claim 16, wherein at least one of
2 said first context information and said second context
3 information forms an entry in a dictionary.

1 21. A method for facilitating compressed message
2 communication between a first communication entity and a
3 second communication entity, said method comprising:

4 compressing, at said first entity, at least a first
5 communication message using a first context table;

6 compressing, at said first entity, at least a second
7 communication message using said first context table;

8 transmitting to said second entity, by said first
9 entity, said at least a first communication message using a
10 first communication session, said first communication session
11 having associated first context information;

12 transmitting to said second entity, by said first
13 entity, said at least a second communication message using
14 a second communication session, said second communication
15 session having associated second context information, said
16 first context information substantially equal to said second
17 context information.

1 22. The method of claim 21, said method further
2 comprising:

3 receiving, at said second entity, said at least a first
4 communication message using said first communication session;

5 receiving, at said second entity, said at least a second
6 communication message using said second communication
7 session;

8 decompressing, at said second entity, said at least a
9 first communication message using a second context table;

10 decompressing, at said second entity, said at least a
11 second communication message using said second context table.